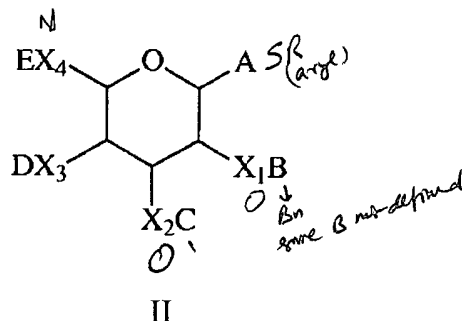


I



II

in which,

A is a leaving group selected from the group consisting of -SR ; where R is alkyl, substituted alkyl, alkenyl, substituted alkenyl, alkenyl, substituted alkenyl, cycloalkyl, substituted cycloalkyl, aryl, substituted aryl, halogen; trichloroacetimidoyl; sulfoxide; and -O- alkenyl;

Allyl
cont.
X₁, X₂, and X₃ are independently selected from H, O, N, or N₃, with the proviso that only one of X₁, X₂, and X₃ may be H, N or N₃ in any molecule;

X₄ is H, -CH₂O, -CH₂N, -CH₃, -CH₂N₃ or -COO-, with the proviso that X₄

should say what is?
(may only be) H, -CH₂N, -CH₃ or CH₂N₃ when none of X₁ to X₃ is H; and

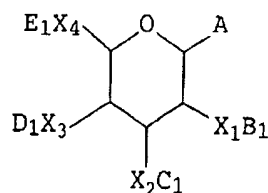
B, C, D and E are different, and are selected from protecting groups which

(can be) cleaved orthogonally in any order,

? and in which,

B or C or D or E is absent if the corresponding X₁ to X₃ is H or N₃, or if the corresponding X₄ is H, -CH₃ or -CH₂N₃.

13. A monosaccharide building block according to claim 12, which is a
 compound of General Formula III



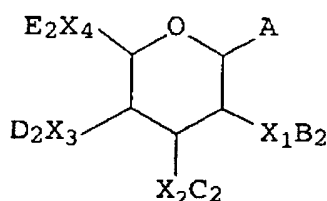
III

in which,

A, X₁, X₂, X₃ and X₄ are as defined for General Formulae I and II, and

B₁, C₁, D₁, and E₁ are orthogonal carbohydrate protecting groups selected from [protecting group sets 1, 2, 6 and 8 as herein defined.] "sets" of protecting groups are not defined.

14. A monosaccharide building block according to claim 12, which is a
 compound of General Formula IV



IV

in which,

A, X₁, X₂, X₃ and X₄ are as defined for General Formulae I and II, and

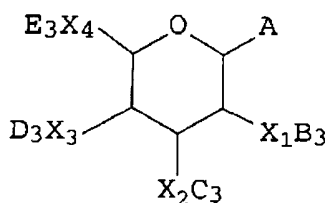
B₂, C₂, D₂ and E₂ are selected from the members of protecting group [set 1,] ?

and in themselves constitute an orthogonal set.

set is not defined.

15. A monosaccharide building block according to claim 14, in which the members of protecting group set 1 are levanoyl, chloroacetate, *p*-methoxybenzyloxycarbonyl and 2-trimethylsilylethylcarbonate.

16. A monosaccharide building block according to claim 12, which is a compound of General Formula V



V

in which,

A, X₁, X₂, X₃ and X₄ are as defined for General Formulae I and II, and

B₃, C₃, D₃ and E₃ are an orthogonal set of protecting groups selected from

superfluous
[amongst] the members of set 1 and [from the remaining orthogonal sets.] *what remaining sets?*

17. A method of synthesis of a molecule selected from the group consisting of glycoconjugates of non-carbohydrate molecules, neo-glycoconjugates and oligosaccharides, comprising the step of using a monosaccharide building block according to claim 12.

18. A method according to claim 17, in which the molecule comprises one or more compounds in which substituents are linked to a pyranose or furanose ring.

19. A method according to claim 17, in which the molecule comprises a sugar analogue.

*No synthesis steps
Use claim 17-22
101 & 112 2002*